

REMARKS

Favorable reconsideration is respectfully requested in view of the foregoing amendments and following remarks.

Claim 10 has been amended so as to be directed to a method for manufacturing a car body. Please see page 5, line 26 to page 9, line 3 of the specification. It is believed that the amendments to claim 10 will clearly distinguish the present invention from Luch '385. Claims 11-13, 15 and 17-21 have been amended so as to be directed to the method of claim 10. Claims 16, 22-27 and 29-32 have been cancelled without prejudice.

Favorable reconsideration is respectfully requested in view of the foregoing amendments and following remarks.

There is a single rejection of the former claims. Claims 10-13, 15-26 and 29-30 were rejected under 35 USC 103 as being unpatentable over Luch '385 in view of Luch '699 or Luch '093 and further in view of the admitted prior art of Midogohchi et al. or Horibe et al. This ground of rejection is respectfully traversed as applied to the amended claims.

As mentioned in the amended Claim 10, the present invention relates to a method for manufacturing car body which comprises the following steps (a)-(c):

- (a) cutting, molding or, if necessary, joining a coated metal plate, and thereby forming a shell body for a car body;
- (b) electrodepositing an electrodeposition paint on the shell body; and
- (c) applying a top coat paint.

According to the method of the present invention, effects as described below can be obtained:

- (1) Metal plate is coated directly with plastic, and is therefore improved notably in chipping resistance as compared with that of composite coating film which is produced by electrodeposition coating-intermediate coating-top coating.
- (2) Intermediate coating can be omitted, so that coating steps can be shortened, and the amount of VOC (volatile organic compounds) can be reduced to a large extent.

(3) Electrodeposition coating film which is applied on a plastic-coated surface has excellent flatness, and, therefore, the surface of top coating film which is formed thereon is also improved in flatness and distinctness-of-image gloss.

Luch '385, on the other hand, discloses a process of electroplating aluminum comprising mechanically forming a composite aluminum-platable plastic structure, masking any exposed aluminum and thereafter electroplating the platable plastic surface.

In Luch '385, as mentioned in column 2, lines 12-20, the platable plastic surface of a composite aluminum-platable plastic structure is plated with nickel. Thus, Luch '385 is definitely different from the present invention wherein an electrodeposition paint comprising a combination of external crosslinking base resin and curing agent or internal crosslinking base resin is electrodeposited.

The reason for plating aluminum with nickel in Luch '385 is, as mentioned in column 1, lines 8-21, that a plain or anodized aluminum bumper is considered by some to be unattractive when compared to the nickel-plated chromium topped steel bumpers which have been conventionally used on automobiles in the U.S.

Furthermore, the reason for plating aluminum not directly with nickel but with nickel via platable plastic surface in Luch '385 is that plating aluminum directly with nickel is tedious, expensive and at times give erratic results.

In the present invention, on the other hand, the purpose of laminating metal plate with a conductive plastic film or sheet is to give chipping resistance, and to thereby omit intermediate coating. In this regard, laminating metal plate with a conductive plastic film or sheet in the present invention is essentially different from the formation of composite aluminum-platable plastic structure in Luch '385.

In Luch '385, the purpose of electroplating is to give nickel gloss to aluminum. In the present invention, on the other hand, the purpose of applying electrodeposition paint is to give edge corrosion resistance and to enhance adhesion to top coat paint which is to be applied on the electrodeposition paint film so that the final (uppermost) coating film may thereby be improved in

distinctness-of-image gloss and smoothness. Thus, the purpose of applying electrodeposition paint in the present invention is quite different from the purpose of electroplating in Luch '385.

If electroplated nickel were coated with a top coat paint in Luch '385, the objective of Luch '385 could not be achieved. Moreover, if nickel-plated surface were coated with a top coat paint, it would be impossible to improve the top coating surface in distinctness-of-image gloss and smoothness, and, besides, the adhesion of coating would be poor.

As stated above, Luch '385 neither teaches or suggests the features and advantages of the present invention.

It is therefore respectfully submitted that the present invention is unobvious and patentable over Luch '385.

The Examiner has further cited Luch '699 and Luch '093, with respect to the volume specific resistance and surface resistance of the conductive plastic film or sheet. These references, however, only disclose an idea of coating non-conductive substrate with organic polymer-carbon black mixture, and plating the resultant coating surface with metal such as nickel and cobalt. Thus, these references do not teach or suggest such features and advantages of the present invention as set forth above.

With regard to the electrodeposition paint which is used in the present invention, the Examiner has cited Midogohchi et al. and Horibe et al. Also these references neither teach nor suggest the features and advantages of the present invention.

It would be clear therefore that no skilled person could have attained the present invention even though the teachings of Luch '385 had been combined with Luch '699 or Luch '093 and/or Midogohchi et al. or Horibe et al.

Thus, it is respectfully submitted that the present invention is unobvious and patentable over Luch '385 in view of Luch '699 or Luch '093 and in further view of the admitted prior or Midogohchi et al. or Horibe et al.

In view of the foregoing, it is favorable reconsideration and allowance is respectfully solicited.

Respectfully submitted,

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